



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER OF PATENTS AND TRADEMARKS  
Washington, D.C. 20231  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/379,722	08/24/1999	CAMERON BOLITHO BROWNE	169.1418	1633

5514 7590 07/16/2002

FITZPATRICK CELLA HARPER & SCINTO  
30 ROCKEFELLER PLAZA  
NEW YORK, NY 10112

EXAMINER

HARRISON, CHANTE E

ART UNIT

PAPER NUMBER

2672

DATE MAILED: 07/16/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

TR

## Office Action Summary

Application No.

09/379,722

Applicant(s)

BROWNE ET AL.

Examiner

Chante Harrison

Art Unit

2672

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☐ Responsive to communication(s) filed on 29 April 2002.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☐ Claim(s) 1-93 is/are pending in the application.
- 4a) Of the above claim(s) 30,31,61,62,92 and 93 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☐ Claim(s) 1-3,32-34 and 63-65 is/are rejected.
- 7) ☐ Claim(s) 4-29,35-60 and 66-91 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

### Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

### Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 8.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

**DETAILED ACTION**

1. This action is responsive to communications: Amendment A, filed on 4/29/02.

***This action is made FINAL.***

2. Claims 1-93 are pending in the case. Claims 1, 32 and 63 are independent claims. All claims have been amended. Claims 30-31, 61-62 and 92-93 have been cancelled.

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-3, 32-34 and 63-65 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rice et al., U.S. Patent 6,268,871, 7/2001, 345/442.

As per independent claim 1, Rice discloses selecting a direction (FIG. 4 '30'; col. 4, ll. 33), generating a first vector (FIG. 4 '30a'), generating a second vector (col. 4, ll. 21 et seq.), the curve direction along a first endpoint to a second endpoint (FIG. 4; col. 3, ll. 33 et seq.), and is closest to the selected direction (col. 4, ll. 30 et seq.), the space curve having one of two directions (FIG. 10), either a forward direction from initial to terminating endpoint (FIG. 5, ll. 35-38; FIG. 6) or a reverse direction along the curve from the terminating to the initial endpoint (col. 5, ll. 35-38; FIG. 6) and orienting the curve direction in accordance with the determined direction (col. 4, ll. 29 et seq.). Rice fails to disclose comparing the vectors, however it would have been obvious to one of skill in the art to compare the first and second vectors because Rice teaches implementing geometric continuity conditions to ensure the location of the generated second vector with that of underlying geometry (col. 4, ll. 21 et seq.).

As per dependent claims 2, 33 and 64, Rice discloses determining endpoints (col. 3, ll. 25 et seq.) and generating a second vector connecting the endpoints (col. 4, ll. 21 et seq.).

As per dependent claims 3, 34 and 65, Rice discloses determining endpoints (col. 3, ll. 25 et seq.) and generating two-second vectors connecting the endpoints (FIG. 4; col. 4) and having opposite directions (FIG. 4 '12a' & '12c').

As per independent claim 32, Rice discloses an apparatus (FIG. 14) for performing the method of claim 1. Therefore the rejection as applied to claim 1 is included herein.

As per independent claim 63, Rice discloses a program (FIG. 14 '214') for performing the method of claim 1. Therefore the rejection as applied to claim 1 is included herein.

Claims 4-29, 35-60 and 66-91 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

***Response to Arguments***

1. Applicant's arguments filed 4/29/02 have been fully considered but they are not persuasive. Rice et al., U.S. Patent 6,268,871, discloses user specification of curve conditions, which must be met to generate a curve that is oriented with existing geometry (col. 4, ll. 12-25). Curve conditions disclosed by Rice et al. include identifying points with direction (col. 4, ll. 26-37). Therefore the previous rejection is maintained.

2. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Chante Harrison** whose telephone number is **(703) 305-3937**.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, **Michael Razavi**, can be reached at **(703) 305-4713**.

**Any response to this action should be mailed to:**

Commissioner of Patents and Trademarks  
Washington, D.C. 20231

**or faxed to:**

**(703) 872-9314 (for Technology Center 2600 only)**

Hand-delivered responses should be brought to Crystal Park II, 2121 Crystal Drive, Arlington, VA, Sixth Floor (Receptionist).

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center 2600 Customer Service Office whose telephone number is (703) 306-0377.

Application/Control Number: 09/379,722  
Art Unit: 2672

Page 7

A handwritten signature in black ink, consisting of a series of loops and a long horizontal stroke extending to the right.

**MICHAEL RAZAVI**  
**SUPERVISORY PATENT EXAMINER**  
**TECHNOLOGY CENTER 2600**